

Solving and Graphing Compound Inequalities Notes

Compound Inequalities:

Sometimes we will have inequalities with three parts:

$$-3 \leq 2x - 1 \leq 5$$

Goal of Solving Compound Inequalities:

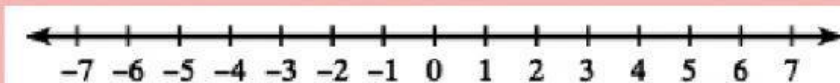
Example 1:

$$-3 \leq 2x - 1 \leq 5$$

$$-3 \leq 2x - 1 \leq 5$$

$$\leq 2x \leq$$

$$\leq x \leq$$



Same as saying: $x \geq$ and $x \leq$

Interval Notation Solution:

$x =$

Graphing Tool Kit:



Example 2:

$$0 < \frac{x}{3} - 1 < 1$$

$$0 < \frac{x}{3} - 1 < 1$$

$$< \frac{x}{3} <$$

$$< x <$$

Same as saying: $x >$ and $x <$

Interval Notation Solution:

$x =$

Graphing Tool Kit:

